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RAW SEQUENCE LISTING

PATENT APPLICATION: US/10/810,160

DATE: 09/30/2004

TIME: 15:01:39

Input Set : A:\SEQLIST416272001301.TXT

Output Set: N:\CRF4\09302004\J810160.raw

4 <110> APPLICANT: Cho, Myeong-Je
 5 Lemaux, Peggy G.
 6 Buchanan, Bob B.
 7 Wong, Joshua
 8 Marx, Corina
 10 <120> TITLE OF INVENTION: VALUE-ADDED TRAITS IN GRAIN AND SEED
 11 TRANSFORMED WITH THIOREDOXIN
 14 <130> FILE REFERENCE: 416272001301
 16 <140> CURRENT APPLICATION NUMBER: US 10/810,160
 17 <141> CURRENT FILING DATE: 2004-03-25
 19 <150> PRIOR APPLICATION NUMBER: US 09/538,864
 20 <151> PRIOR FILING DATE: 2000-03-29
 22 <150> PRIOR APPLICATION NUMBER: US 60/126,736
 23 <151> PRIOR FILING DATE: 1999-03-29
 25 <150> PRIOR APPLICATION NUMBER: US 60/127,198
 26 <151> PRIOR FILING DATE: 1999-03-31
 28 <150> PRIOR APPLICATION NUMBER: US 60/169,162
 29 <151> PRIOR FILING DATE: 1999-12-06
 31 <150> PRIOR APPLICATION NUMBER: US 60/177,740
 32 <151> PRIOR FILING DATE: 2000-01-21
 34 <150> PRIOR APPLICATION NUMBER: US 60/177,739
 35 <151> PRIOR FILING DATE: 2000-01-21
 37 <160> NUMBER OF SEQ ID NOS: 25
 39 <170> SOFTWARE: FastSEQ for Windows Version 4.0
 41 <210> SEQ ID NO: 1
 42 <211> LENGTH: 486
 43 <212> TYPE: DNA
 44 <213> ORGANISM: Artificial Sequence
 46 <220> FEATURE:
 47 <223> OTHER INFORMATION: barley B1-hordein promoter and signal sequence
 49 <400> SEQUENCE: 1
 50 aagctttaac aaccacaca ttgattgcaa ctagtccta cacaagtttt ccattcttgt 60
 51 ttcaggctaa caacctatac aagggtccaa aatcatgcaa aagtgatgct aggttgataa 120
 52 tgtgtgacat gtaaagtga taagggtgagt catgcatacc aaacctcggg atttctatac 180
 53 tttgtgtatg atcatatgca caactaaaag gcaactttga ttatcaattg aaaagtaccg 240
 54 cttgttagctt gtgcaaccta acacaatgtc caaaaatcca tttgcaaaaag catccaaaca 300
 55 caattgttaa agctgttcaa acaaacaaaag aagagatgaa gcctggctac tataaatagg 360
 56 caggtagtat agagatctac acaagcacia gcatcaaaac caagaaacac tagttaacac 420
 57 caatccacta tgaagacctt cctcatcttt gcactcctcg ccattgcggc aacaagtacg 480
 58 attgca 486
 60 <210> SEQ ID NO: 2
 61 <211> LENGTH: 19
 62 <212> TYPE: PRT

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63 <213> ORGANISM: Artificial Sequence
65 <220> FEATURE:
66 <223> OTHER INFORMATION: barley B1-hordein signal protein
68 <400> SEQUENCE: 2
69 Met Lys Thr Phe Leu Ile Phe Ala Leu Leu Ala Ile Ala Ala Thr Ser
70 1           5           10           15
71 Thr Ile Ala
75 <210> SEQ ID NO: 3
76 <211> LENGTH: 497
77 <212> TYPE: DNA
78 <213> ORGANISM: Artificial Sequence
80 <220> FEATURE:
81 <223> OTHER INFORMATION: barley D-hordein promoter and signal sequence
83 <400> SEQUENCE: 3
84 cttcgagtgc ccgccgattt gccagcaatg gctaacagac acatattctg ccaaaacccc 60
85 agaacaataa tcatttctcg tagatgaaga gaacagacca agatacaaac gtccacgctt 120
86 cagcaaacag taccacagaa ctaggattaa gccgattacg cggcttttagc agaccgtcca 180
87 aaaaaactgt ttgcaaagc tccaattcct ccttgcttat ccaatttctt ttgtgttggc 240
88 aaactgcact tgtccaaccg attttgttct tcccggtgtt cttcttaggc taactaacac 300
89 agccgtgcac atagccatgg tccggaatct tcacctgctc cctataaaag cccagccaat 360
90 ctccacaatc tcattcatc cgagaacacc gagaaccaca aaactagaga tcaattcatt 420
91 gacagtccac cgagatggct aagcggctgg tcctctttgt ggcggtaatc gtcgcctcgc 480
92 tggctctcac caccgct                                     497
94 <210> SEQ ID NO: 4
95 <211> LENGTH: 20
96 <212> TYPE: PRT
97 <213> ORGANISM: Artificial Sequence
99 <220> FEATURE:
100 <223> OTHER INFORMATION: barley D-hordein signal protein
102 <400> SEQUENCE: 4
103 Ala Lys Arg Leu Val Leu Phe Val Ala Val Ile Val Ala Leu Val Ala
104 1           5           10           15
105 Leu Thr Thr Ala
106                20
109 <210> SEQ ID NO: 5
110 <211> LENGTH: 28
111 <212> TYPE: DNA
112 <213> ORGANISM: Artificial Sequence
114 <220> FEATURE:
115 <223> OTHER INFORMATION: primer
117 <400> SEQUENCE: 5
118 atatctagaa tggcggcgctc ggcggcga                                     28
120 <210> SEQ ID NO: 6
121 <211> LENGTH: 27
122 <212> TYPE: DNA
123 <213> ORGANISM: Artificial Sequence
125 <220> FEATURE:
126 <223> OTHER INFORMATION: primer
128 <400> SEQUENCE: 6

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129 atagagctct tactgggccc cgtgtag                27
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132 <211> LENGTH: 26
133 <212> TYPE: DNA
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136 <220> FEATURE:
137 <223> OTHER INFORMATION: primer
139 <400> SEQUENCE: 7
140 gtaaagcttt aacaacccac acattg                26
142 <210> SEQ ID NO: 8
143 <211> LENGTH: 34
144 <212> TYPE: DNA
145 <213> ORGANISM: Artificial Sequence
147 <220> FEATURE:
148 <223> OTHER INFORMATION: primer
150 <400> SEQUENCE: 8
151 ccgacgccgc tgcaatcgta cttgttgccg caat        34
153 <210> SEQ ID NO: 9
154 <211> LENGTH: 33
155 <212> TYPE: DNA
156 <213> ORGANISM: Artificial Sequence
158 <220> FEATURE:
159 <223> OTHER INFORMATION: primer
161 <400> SEQUENCE: 9
162 agaaagcttg gtacccttcg agtgcccgcc gat        33
164 <210> SEQ ID NO: 10
165 <211> LENGTH: 48
166 <212> TYPE: DNA
167 <213> ORGANISM: Artificial Sequence
169 <220> FEATURE:
170 <223> OTHER INFORMATION: primer
172 <400> SEQUENCE: 10
173 gaacagctcc tcgcccttgc tcacagcggg ggtgagagcc acgagggc  48
175 <210> SEQ ID NO: 11
176 <211> LENGTH: 19
177 <212> TYPE: DNA
178 <213> ORGANISM: Artificial Sequence
180 <220> FEATURE:
181 <223> OTHER INFORMATION: primer
183 <400> SEQUENCE: 11
184 ccaagaagtt cccagctgc                        19
186 <210> SEQ ID NO: 12
187 <211> LENGTH: 27
188 <212> TYPE: DNA
189 <213> ORGANISM: Artificial Sequence
191 <220> FEATURE:
192 <223> OTHER INFORMATION: primer
194 <400> SEQUENCE: 12
195 aactctagac tcggtggact gtcaatg                27

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197 <210> SEQ ID NO: 13
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199 <212> TYPE: DNA
200 <213> ORGANISM: Artificial Sequence
202 <220> FEATURE:
203 <223> OTHER INFORMATION: primer
205 <400> SEQUENCE: 13
206 catcgagaca agcacggtca acttc 25
208 <210> SEQ ID NO: 14
209 <211> LENGTH: 24
210 <212> TYPE: DNA
211 <213> ORGANISM: Artificial Sequence
213 <220> FEATURE:
214 <223> OTHER INFORMATION: primer
216 <400> SEQUENCE: 14
217 atatccgagc gcctcgtgca tgcg 24
219 <210> SEQ ID NO: 15
220 <211> LENGTH: 24
221 <212> TYPE: DNA
222 <213> ORGANISM: Artificial Sequence
224 <220> FEATURE:
225 <223> OTHER INFORMATION: primer
227 <400> SEQUENCE: 15
228 caagatggat tgcacgcagg ttct 24
230 <210> SEQ ID NO: 16
231 <211> LENGTH: 23
232 <212> TYPE: DNA
233 <213> ORGANISM: Artificial Sequence
235 <220> FEATURE:
236 <223> OTHER INFORMATION: primer
238 <400> SEQUENCE: 16
239 atagaaggcg atgcgctgca aat 23
241 <210> SEQ ID NO: 17
242 <211> LENGTH: 29
243 <212> TYPE: DNA
244 <213> ORGANISM: Artificial Sequence
246 <220> FEATURE:
247 <223> OTHER INFORMATION: primer
249 <400> SEQUENCE: 17
250 cggaattcga tctagtaaca tagatgaca 29
252 <210> SEQ ID NO: 18
253 <211> LENGTH: 26
254 <212> TYPE: DNA
255 <213> ORGANISM: Artificial Sequence
257 <220> FEATURE:
258 <223> OTHER INFORMATION: primer
260 <400> SEQUENCE: 18
261 ggtctagaat ggaaactcac aaaacc 26
263 <210> SEQ ID NO: 19

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264 <211> LENGTH: 23
265 <212> TYPE: DNA
266 <213> ORGANISM: Artificial Sequence
268 <220> FEATURE:
269 <223> OTHER INFORMATION: primer
271 <400> SEQUENCE: 19
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274 <210> SEQ ID NO: 20
275 <211> LENGTH: 26
276 <212> TYPE: DNA
277 <213> ORGANISM: Artificial Sequence
279 <220> FEATURE:
280 <223> OTHER INFORMATION: primer
282 <400> SEQUENCE: 20
283 gggagctctc aatcactctt accctc            26
285 <210> SEQ ID NO: 21
286 <211> LENGTH: 21
287 <212> TYPE: DNA
288 <213> ORGANISM: Artificial Sequence
290 <220> FEATURE:
291 <223> OTHER INFORMATION: primer
293 <400> SEQUENCE: 21
294 aagcctgaac tcaccgcgac g                21
296 <210> SEQ ID NO: 22
297 <211> LENGTH: 22
298 <212> TYPE: DNA
299 <213> ORGANISM: Artificial Sequence
301 <220> FEATURE:
302 <223> OTHER INFORMATION: primer
304 <400> SEQUENCE: 22
305 aagaccaatg cggagcatat ac                22
307 <210> SEQ ID NO: 23
308 <211> LENGTH: 36
309 <212> TYPE: DNA
310 <213> ORGANISM: Artificial Sequence
312 <220> FEATURE:
313 <223> OTHER INFORMATION: primer
315 <400> SEQUENCE: 23
316 ggcgcgatgcg aattcgaatt cgatatcgat cttega 36
318 <210> SEQ ID NO: 24
319 <211> LENGTH: 369
320 <212> TYPE: DNA
321 <213> ORGANISM: Barley
323 <220> FEATURE:
324 <221> NAME/KEY: misc_feature
325 <222> LOCATION: (1)...(369)
326 <223> OTHER INFORMATION: thioredoxin h
328 <400> SEQUENCE: 24
329 atggcgggcgt cggcaacggc ggcggcagtg gcggcggagg tgatctcggt ccacagcctg 60

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VERIFICATION SUMMARY

PATENT APPLICATION: US/10/810,160

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Input Set : A:\SEQLIST416272001301.TXT

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